

**510(k) SUMMARY OF SAFETY AND EFFECTIVENESS****SUBMITTER INFORMATION**

A. Company Name: Triage Medical, Inc  
B. Company Address: 13700 Alton Parkway  
Suite 160  
Irvine, CA 92618  
C. Company Phone: (949) 472-0006  
D. Company Facsimile: (949) 472-0016  
E. Contact Person: Gayle Hirota  
Manager, Quality Assurance & Regulatory  
Affairs

**DEVICE IDENTIFICATION**

A. Trade Name: 4.5mm LS Facet Compression Device with  
Polymer Washer  
B. Catalog Number: LSPW-45-3040  
C. Common Name: Facet Screw  
D. Classification Name: Unclassified  
E. Product Code: MRW  
F. Device Panel: Orthopedic  
G. Device Class:

**IDENTIFICATION OF MODIFIED DEVICE**

The 4.5mm LS Facet Compression Device with Polymer Washer is similar in basic design and intended use to the Triage Medical BONE-LOK<sup>®</sup> 4.5mm Facet Screw, cleared under 510(k) K043351.

**DEVICE DESCRIPTION**

The 4.5mm LS Facet Compression Device is a double-helix screw with a compression-locking collar. It is available as 4.5mm diameter device and is obtainable in a 30-40mm length range. The 4.5mm LS Facet Compression Device with Polymer Washer is intended for single use only.

Devices are provided "STERILE" and are double-pouched in Tyvek<sup>®</sup>/film pouches and sterilized by gamma radiation.

**INTENDED USE**

The intended use of the 4.5mm LS Facet Compression Device with Polymer Washer is to stabilize the spine as an aid to fusion through bilateral immobilization of the facet joints. The screws are inserted posteriorly through the superior side of the facet, across the facet joint and into the pedicle. The 4.5mm LS Facet Compression Device with Polymer Washer is intended for bilateral facet fixation, with or without bone graft, at single or multiple levels from L1 to S1.

**TECHNOLOGICAL CHARACTERISTICS**

The 4.5mm LS Facet Compression Device with Polymer Washer is similar in basic design, construction and mechanical performance to the previously cleared BONE-LOK® 4.5mm Facet Screw. Device modifications includes washers fabricated from a polymer, as well as modifications to component shape/design and device implantation method.

**BIOCOMPATIBILITY AND PERFORMANCE DATA**

The materials the 4.5mm LS Facet Compression Device with Polymer Washer are made from meet the requirements of ASTM F-136 (titanium) or ASTM F-138 (stainless steel). The polymer washer meets the requirements of USP Class VI and ISO 10993-1. The titanium alloys, stainless steel, and polymer used are identical to a myriad of legally marketed orthopedic spinal fixation devices.

Performance test results indicate that the device is safe and satisfies functional performance requirements when used as indicated.

**CONCLUSIONS DRAWN FROM STUDIES**

The test results demonstrate that the modified 4.5mm LS Facet Compression Device with Polymer Washer is substantially equivalent to the predicate device and is capable of safely and accurately performing the stated intended use.



DEPARTMENT OF HEALTH & HUMAN SERVICES

Public Health Service

Food and Drug Administration  
9200 Corporate Boulevard  
Rockville MD 20850

AUG 5 - 2005

Ms. Gayle Hirota  
QA/RA Manager  
Triage Medical, Inc.  
13700 Alton Parkway, Suite 160  
Irvine, California 92618

Re: K051949

Trade/Device Name: 4.5mm LS Facet Compression Device with Polymer Washer  
Regulatory Class: Unclassified  
Product Code: MRW  
Dated: July 13, 2005  
Received: July 18, 2005

Dear Ms. Hirota:

We have reviewed your Section 510(k) premarket notification of intent to market the device referenced above and have determined the device is substantially equivalent (for the indications for use stated in the enclosure) to legally marketed predicate devices marketed in interstate commerce prior to May 28, 1976, the enactment date of the Medical Device Amendments, or to devices that have been reclassified in accordance with the provisions of the Federal Food, Drug, and Cosmetic Act (Act) that do not require approval of a premarket approval application (PMA). You may, therefore, market the device, subject to the general controls provisions of the Act. The general controls provisions of the Act include requirements for annual registration, listing of devices, good manufacturing practice, labeling, and prohibitions against misbranding and adulteration.

If your device is classified (see above) into either class II (Special Controls) or class III (PMA), it may be subject to such additional controls. Existing major regulations affecting your device can be found in the Code of Federal Regulations, Title 21, Parts 800 to 898. In addition, FDA may publish further announcements concerning your device in the Federal Register.

Please be advised that FDA's issuance of a substantial equivalence determination does not mean that FDA has made a determination that your device complies with other requirements of the Act or any Federal statutes and regulations administered by other Federal agencies. You must comply with all the Act's requirements, including, but not limited to: registration and listing (21 CFR Part 807); labeling (21 CFR Part 801); good manufacturing practice requirements as set forth in the quality systems (QS) regulation (21 CFR Part 820); and if applicable, the electronic product radiation control provisions (Sections 531-542 of the Act); 21 CFR 1000-1050. This letter will allow you to begin marketing your device as described in your Section 510(k) premarket notification. The FDA finding of substantial equivalence of your device to a legally

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marketed predicate device results in a classification for your device and thus, permits your device to proceed to the market.

If you desire specific advice for your device on our labeling regulation (21 CFR Part 801), please contact the Office of Compliance at (240) 276-0120. Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21CFR Part 807.97). You may obtain other general information on your responsibilities under the Act from the Division of Small Manufacturers, International and Consumer Assistance at its toll-free number (800) 638-2041 or (301) 443-6597 or at its Internet address <http://www.fda.gov/cdrh/industry/support/index.html>.

Sincerely yours,

A handwritten signature in black ink, appearing to read "Mark N. Melkerson". The signature is stylized with a large, looped "M" and a cursive "N. Melkerson".

Mark N. Melkerson, M.S.

Acting Director

Division of General, Restorative,  
and Neurological Devices

Office of Device Evaluation

Center for Devices and

Radiological Health

Enclosure

**SECTION 1.6      Indications for Use**

510(k) Number (if known): K051949

Device Name:                      4.5mm LS Facet Compression Device with Polymer Washer

Indications For Use:            The 4.5mm LS Facet Compression Device with Polymer Washer is indicated for spondylolisthesis, spondylolysis, degenerative disc disease (DDD) as defined by neck and/or back pain of discogenic origin as confirmed by radiographic studies, degeneration of the facets with instability and fracture, pseudoarthrosis or failed previous fusion.

The intended use of the 4.5mm LS Facet Compression Device with Polymer Washer is to stabilize the spine as an aid to fusion through bilateral immobilization of the facet joints. The screws are inserted posteriorly through the superior side of the facet, across the facet joint and into the pedicle. The 4.5mm LS Facet Compression Device with Polymer Washer is indicated for bilateral facet fixation, with or without bone graft, at single or multiple levels from L1 to S1.

Prescription Use   X    
(Part 21 CFR 801 Subpart D)

AND/OR

Over-The-Counter Use \_\_\_\_\_  
(21 CFR 807 Subpart C)

(PLEASE DO NOT WRITE BELOW THIS LINE-CONTINUE ON ANOTHER PAGE IF NEEDED)

Concurrence of CDRH, Office of Device Evaluation (ODE)

  
(Division Sign-Off)

Division of General, Restorative,  
and Neurological Devices

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